



PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In Re Application of )  
Eliezer MASLIAH ) FOR: DEVELOPMENT TO  
Serial No.: 09/933,640 ) TRANSGENIC MODEL FOR  
Filed: August 20, 2001 ) INTERVENTIONS IN  
 ) NEURODEGENERATIVE  
 ) DISEASES  
 ) Group  
 ) Art Unit: 1632

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**INFORMATION DISCLOSURE STATEMENT  
UNDER 37 C.F.R. §§ 1.97 and 1.98**

Commissioner for Patents  
P. O. Box 2327  
Arlington, VA 22202

Attention: Examiner

Dear Sir:

Applicants submit herewith references of which they are aware, which they believe may be material to patentability of the invention disclosed and claimed in the above-cited application and with respect to which there may be a duty to disclose in accordance with 37 C.F.R. § 1.56.

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*Karen Johnson*  
(Signature)

August 6, 2002

(Date of Signature)

Applicants are submitting herewith copies of the references which are set forth on the attached Form PTO/SB/08A. As all relevant parts of the references are in the English language, no explanation of the references is provided herein.


This Information Disclosure Statement is submitted within three (3) months of the filing date of the above-cited application or of the date of entry into the national phase of the application or prior to the mailing date of a first Office Action thereon, whichever has occurred last, such that no fee is required.

Further, while the references provided in this Information Disclosure Statement may be material to patentability pursuant to 37 C.F.R. § 1.56, it is not intended to constitute an admission that any reference referred to herein is prior art for this invention unless specifically designated as such.

Also, in accordance with 37 C.F.R. § 1.97(g), the filing of this Information Disclosure Statement shall not be construed to mean that a search has been made or that no other material information as defined in 37 C.F.R. § 1.56(a) exists.

Respectfully submitted,

Dated: August 6, 2002

By:   
Colleen J. McKiernan  
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Registration No. 48,570

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Docket No.: 6627-PA1071



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PTO/SB/21 (6-98)  
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<b>TRANSMITTAL FORM</b> <i>(to be used for all correspondence after initial filing)</i>	Application Number	09/933,640	
	Filing Date	August 20, 2001	
	First Named Inventor	Eliezer MASLIAH et al.	
	Group Art Unit	1632	
	Examiner Name	UNKNOWN	
Total Number of Pages in This Submission	8	Attorney Docket Number	6627-PA1071

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Firm or Individual name	Colleen J. McKiernan 48,570
Signature	
Date	August 6, 2002

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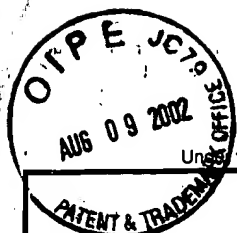
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						Application Number				09/933,640				
						Filing Date				August 20, 2001				
						First Named Inventor				Eliezer MASLIAH				
						Group Art Unit				1632				
				Examiner Name				Unknown						
Sheet		1		of		5		Attorney Docket Number				6627-PA1071		
<b>U.S. PATENT DOCUMENTS</b>														
Examiner Initials*	Cite No. <sup>1</sup>	U.S. Patent Document			Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY								
		Number	Kind Code <sup>2</sup> (if known)											
	1	4,736,866			Leder	04-12-1988								
	2	5,574,206			Jolicoeur	11-12-1996								
<b>FOREIGN PATENT DOCUMENTS</b>														
Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document			Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	T <sup>6</sup>							
		Office <sup>3</sup>	Number <sup>4</sup> (if known)	Kind Code <sup>5</sup>										
Examiner Signature						Date Considered								

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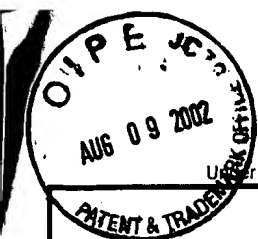
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				Group Art Unit		
				Examiner Name		
Sheet		2	of	5	Attorney Docket Number	6627-PA1071
OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS						
Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.				T <sup>2</sup>
	1	Andrää, K., Abramowski, D., Duke, M., Probst, A., Wiederhold, K.-H., Bührki, K., Goedert, M., Sommer, B. & Staufenbiel, M. (1996) Expression of APP in transgenic mice: a comparison of neuron-specific promoters. <i>Neurobiol. Aging</i> 17, 183-190.				
	2	Borchelt DR, Davis J, Fischer M, Lee MK, Slunt HH, Ratovitsky T, Regard J, Copeland NG, Jenkins NA, Sisodia SS, Price DL. (1996) A vector for expressing foreign genes in the brains and hearts of transgenic mice. <i>Genet. Anal.</i> 13:159-63.				
	3	Carlson, G.A., Borchelt, D.R., Dake, A., Turner, S., Danielson, V., Coffin, J.D., Eckman, C., Meiners, J., Nilsen, S.P., Younkin, S.G. and Hsiao (1997) Genetic modification of phenotypes produced by amyloid precursor protein overexpression in transgenic mice. <i>Hum. Mol. Gen.</i> 6:1951-9.				
	4	Games, D., Adams, D., Alessandrini, R., Barbour, R., Berthelette, P., <i>et al.</i> (1995) Alzheimer-type neuropathology in transgenic mice overexpressing V717F beta-amyloid precursor protein. <i>Nature (London)</i> 373, 523-528.				
	5	Giasson, B.I., Duda, J.E., Murray, I.V., Chen, Q., Souza, J.M., Hurtig, H.I., Ischiropoulos, H., Trojanowski, J.Q., Lee, V.M. (2000) Oxidative damage linked to neurodegeneration by selective alpha-synuclein nitration in synucleinopathy lesions. <i>Science</i> 290:985-9.				
	6	Hashimoto, M., Hsu, L.J., Xia, Y., Takeda, A., Sisk, A., Sundsmo, M. and Masliah, E. (1999) Oxidative stress induces amyloid-like aggregate formation of NACP/ $\alpha$ -synuclein <i>in vitro</i> . <i>Neuroreport</i> 10:717-21.				
	7	Higgins, L. S., Rodems, J. M., Catalano, R., Quon, D. & Cordell, B. (1995) Early Alzheimer's disease-like histopathology increases in frequency with age in mice transgenic for $\beta$ -APP751. <i>Proc. Natl. Acad. Sci. USA</i> 92, 4402-4406.				
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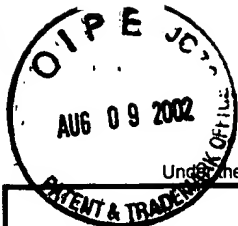
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<b>OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS</b>					
Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.			T <sup>2</sup>
	8	Holtzman, D.M., Bales, K.R., Tenkova, T., Fagan, A.M., Parsadarian, M., Sartorius, L.J., Mackey, B.M., Olney, J., McKeel, D., Wozniak, D. and Paul, S.M. (2000) Apolipoprotein E isoform-dependent amyloid deposition and neuritic degradation in a mouse model of Alzheimer's disease. <i>Proc. Natl. Acad. Sci.</i> 97:2892-7.			
	9	Hsia, A.Y., Masliah, E., McConlogue, L., Yu, G.-Q., Tatsuno, G., Hu, K., Kholodenko, D., Malenka, R.C., Nicoll, R.A. and Mucke, L. (1999) Plaque independent disruption of neural circuits in Alzheimer's disease mouse models. <i>Proc Natl. Acad. Sci. USA</i> 96:3228-33.			
	10	Hsiao KK, Borchelt DR, Olson K, Johannsdottir R, Kitt C, Yunis W, Xu S, Eckman C, Younkin S, Price D, et al.(1995) Age-related CNS disorder and early death in transgenic FVB/N mice overexpressing Alzheimer amyloid precursor proteins. <i>Neuron</i> 15:1203-18			
	11	Hsiao, K., Chapman, P., Nilsen, S., Eckman, C., Harigaya, Y., Younkin, S., Yang, F. & Cole, G. (1996) Correlative Memory Deficits, A $\beta$ Elevation, and Amyloid Plaques in Transgenic Mice. <i>Science</i> 274: 99-102			
	12	Kammesheidt, A., Boyce, F. M., Spanoyannis, A. F., Cummings, B. J., Ortegon, M., Cotman, C., Vaught, J. L. & Neve, R. L. (1992) Deposition of beta/A4 immunoreactivity and neuronal pathology in transgenic mice expressing the carboxyl-terminal fragment of the Alzheimer amyloid precursor in the brain. <i>Proc. Natl. Acad. Sci. USA</i> 89, 10857-10861.			
	13	Kang J, Lemaire HG, Unterbeck A, Salbaum JM, Masters CL, Grzeschik KH, Multhaup G, Beyreuther K, Muller-Hill B. (1987) The precursor of Alzheimer's disease amyloid A4 protein resembles a cell-surface receptor. <i>Nature</i> 325:733-6.			
	14	Lamb, B. T., Sisodia, S. S., Lawler, A. M., Slunt, H. H., Kitt, C. A., Kearns, W. G., Pearson, P. L., Price, D. L. & Gearhart, J. D. (1993) Introduction and expression of the 400 kilobase amyloid precursor protein gene in transgenic mice <i>Nat. Genet.</i> 5, 22-30.			
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Sheet	4	of	5	Attorney Docket Number	6627-PA1071
<b>OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS</b>					
Examiner Initials*	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.			
	15	Masliah, E., Rockenstein, E.M., Veinbergs, I., Mallory, M., Hashimoto, M., Takeda, A., Sagara, Y., Sisk, A., Mucke, L. (2000) Dopaminergic loss and inclusion body formation in alpha-synuclein mice: Implications for neurodegenerative disorders. <i>Science</i> 287:1265-9.			
	16	Morris R. (1984) Developments of a water-maze procedure for studying spatial learning in the rat. <i>J. Neurosci. Meth.</i> 11:47-60.			
	17	Mucke, L., Masliah, E., Johnson, W. B., Ruppe, M. D., Alford, M., Rockenstein, E. M., Forss-Petter, S., Pietropaolo, M., Mallory, M. & Abraham, C. R. (1994) Synaptotrophic effects of human amyloid beta protein precursors in the cortex of transgenic mice <i>Brain Res.</i> 666, 151-167.			
	18	Mucke, L., Abraham, C.R., Ruppe, M.D., Rockenstein, E. M., Toggas, S.M., Mallory, M., Alford, M. and Masliah, E. (1995) Protection against HIV-1 gp120-induced brain damage by neuronal overexpression of human amyloid precursor protein (hAPP) <i>J.Exp.Med.</i> 181: 1551-56.			
	19	Mucke, L., Masliah, E., Yu, G.-Q., Mallory, M., Rockenstein, E.M., Tatsuno, G., Hu, K., Kholodenko, D., Johnson-Wood, K. and McConlogue, L. (2000) High-level neuronal expression of abeta 1-42 in wild-type human amyloid protein precursor transgenic mice: synaptotoxicity without plaque formation <i>J. Neurosci.</i> 20:4050-8.			
	20	Quon, D., Wang, Y., Catalano, R., Scardina, J. M., Murakami, K. & Cordell, B. (1991) Formation of beta-amyloid protein deposits in brains of transgenic mice <i>Nature (London)</i> 352:239-241.			
	21	Rockenstein EM, McConlogue L, Tan H, Power M, Masliah E, Mucke L (1995) Levels and alternative splicing of amyloid beta protein precursor (APP) transcripts in brains of APP transgenic mice and humans with Alzheimer's disease. <i>J. Biol. Chem.</i> 270:28257-28267.			
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Application Number	09/933,640
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Filing Date	August 20, 2001
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First Named Inventor	Eliezer MASLIAH
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Group Art Unit	1632
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Examiner Name	UNKNOWN
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Sheet	5	of	5	Attorney Docket Number	6627-PA1071
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#### OTHER PRIOR ART – NON PATENT LITERATURE DOCUMENTS

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